

DRAFT

EPA Draft Massachusetts North Coastal Small MS4 General NPDES Phase II Permit

Comments submitted by David Standley, Chair, Ipswich Stormwater Advisory Committee and Chair, Ipswich Conservation Commission

Date: March 31, 2010

To: Thelma Murphy, Municipal Permits Branch, Office of Ecosystem Protection, EPA Region I

CC: Fred Civian, Stormwater Coordinator, MA DEP

The Town of Ipswich is a primarily residential coastal community of approximately 13,000 residents in northeast Massachusetts. It has a land area of 33 square miles, extensive beach, bank, salt marsh and tidal flats fronting on Plum Island Sound and Ipswich Bay. Its principal streams are the Ipswich, Miles, Castle Neck, Egypt and Rowley Rivers, with numerous coastal creeks, tributary streams and several ponds.

Three State roads, Routes 1, 1A, and 133, transect the town.

The more densely developed areas of the town are served by a municipal sanitary sewer system with approximately 6000 connections, and Ipswich has a municipal water supply system serving the entire municipality. These systems, and the town's water and wastewater treatment plants, are operated and maintained by the Utilities Department. Under the town's bylaws, that department has no responsibilities with respect to storm water management. The town's Public Works Department is responsible for town's storm water system, streets, sidewalks, and bridges, snow removal, and solid waste management.

The town's area includes two "urbanized areas" as identified pursuant to the 2000 Federal Census that are subject to the 2003 Small MS4 NPDES General Permit. It has met its obligations under that permit. A Storm Water Bylaw has been adopted and Storm Water Management and Connection and Discharge Permit regulations have been promulgated.

So much of the Ipswich and Miles Rivers and Kimball Brook as lie within the "urbanized areas" of Ipswich have been categorized as "impaired waters" although TMDLs have not been established. The town's MS4 includes approximately 140 Stormwater outfalls, of which about 87 are located within the "urbanized areas".

This information has been provided as a background for my comments on the proposed Permit.

General

Costs

These are very challenging economic times. Ipswich, like most municipalities, is facing severe budget constraints which show no signs of abating significantly within the five-year time frame of the proposed permit. All controllable costs of both municipal and school department operating budgets have been cut or, at best, held constant despite inflation; in order to address reductions in state aid and increasing health, retirement and other insurance costs. There is no ability to increase program efforts to address the mandates proposed in this draft permit. As has been pointed out by others, creating a new operating mechanism within municipal government with a new and independent fund-raising capacity is likely to prove very difficult, at least within the permit time frame. In Massachusetts, Proposition 2 1/2 imposes a severe constraint. While federal and state mandates can force municipalities to adjust their program priorities and their budgets, that power should be exercised cautiously and should be accompanied by funding commitments.

Enhanced storm water management is certainly important to pollution prevention, flood control, environmental management and water supply protection. EPA and DEP should continue their efforts in this area while being sensitive to municipal problems, establishing realistic goals, and finding ways to facilitate their attainment.

My overall recommendation, therefore, is to extend the 2003 Permit requirements through 2015 without augmentation or modification except as noted below, while utilizing existing enforcement tools available to Federal and State authorities to address critical water quality problems such as failure to meet TMDLs. This recommendation, made with great reluctance, would be reconsidered should EPA, directly or through the State, make sufficient program grant funds available to allow permittees to undertake the required administrative, monitoring, enforcement and maintenance/construction programs.

Despite the above recommendation, I believe the time could be utilized to complete the system mapping and characterization requirements of the proposed permit. It could also be a time during which municipalities could be compelled to prepare and submit for approval and implementable plan to attain the goal suggested in Part 1.10(c).

Time Frames:

Proposed time frames for responses to (a) the final permit (NOIs) and (b) the Authorization to Discharge (the SWMP) appear to be needlessly and unrealistically limited. This observation is made in light of the above, of the increased complexity and detail of the program, and of the extended periods that have elapsed since (1) the expiration of the 2003 permits and (2) the issuance of the draft NH permit,. In many cases (ie. Ipswich, in all likelihood) future staff limitations/reductions will force towns to rely on consultant services for preparation of required submittals. That carries its own set of

problems. First, the costs for doing so are currently unbudgeted and will be difficult to obtain, affecting other needs; and, second, the limited corps of consultants providing such services and the short time frames to obtain them will lead to a "crunch" environment in which service delivery risks being compromised and prices would likely quickly escalate.

My recommendations are to (a) double the time frames and (b) provide templates for Notices of Intent submittals and SWMPs.

"40B" Comprehensive Permits

On a very different level, the current and draft permits presume and require that the permittees have or can create adequate enforcement provisions, through local bylaws or ordinances and regulations, to ensure that all projects subject to the permit provisions can be required to conform. The Massachusetts affordable housing facilitation statute, MA General Laws Chapter 40B, ss. 20-23 (the Mass. Comprehensive Permit Law) may operate to frustrate that requirement in certain cases. For qualifying development projects, the local zoning appeals board (ZBA) may be required to issue a comprehensive permit for the project. This permit by law typically subsumes all relevant local bylaws, ordinances and regulations, and the ZBA may waive such provisions thereof as it deems appropriate and necessary to do so under that statute. Although State regulations administered by local boards (e.g., 310 CMR 10.00 administered by the local Conservation Commission) are not affected by the Mass. Comprehensive Permit Law, any local bylaw, ordinance or regulation regardless of by whom administered at the local level, even if adopted pursuant to a Federal or State mandate or permit, would be affected if it appears. These developments tend to be large and to be proposed in environmentally sensitive areas. EPA and DEP should review this situation to determine an approach that will ensure that such developments would be captured in the improvements process and duly required to comply with local construction and post-construction stormwater management requirements established pursuant to these NPDES Permits.

Continuation of comment process

I would hope and recommend that as EPA moves toward a final permit document it promulgate at least one further draft for public review and comment.

The comments below are offered in the event my primary recommendation above is not accepted. They are arranged according to the Parts of the draft MS4 Permit. No comments are made on Parts and sections not applicable to the Town of Ipswich.

Part 1

1.7.2 e Submittal of Notice of Intent.

The proposed 90-day time limit for submittal is likely inadequate given the complexity and cost thereof, the procedures necessary for acquisition of the consulting services likely needed for preparation, public information and participation activities, assessments needed to prepare the NOI, and the requirement that the Board of Selectmen sign the document. It has taken EPA nearly two years since the end of the last permit period to propose this draft, and over a year (and counting) to move from draft to final permit in the case of New Hampshire. The submittal period should be extended to at least 180 days.

1.10 Stormwater Management Program (SWMP)

If the Authorization to Discharge includes provisions not reasonably anticipated based on the Final Permit or NOI, additional time for submittal of the SWMP is likely to be required, for the reasons outlined above.

The statement (1.10 (c)) that the permittee is "encouraged" to maintain an adequate source of revenue for the program ignores stark reality. EPA, through DEP, should be ensuring that there are adequate federal funds accessible by the municipalities for these purposes.

Part 2 Non-Numeric Effluent Limitations

2.3.1 Increased Discharges

Clarification is sought regarding the phrase "and is the result of the creation of one or more acres of new impervious surfaces." Does this apply only to new geographic areas "annexed" to an existing MS4 area, as I perceive was suggested at the March 18 public meeting? Alternatively, does it apply to any new project within an existing MS4 area that results in the creation of one or more acres of new impervious surface? Or is it intended to require a continuing inventory of the allowable creation of new impervious surface within an existing MS4 area, with the provision becoming effective when the cumulative additions of new impervious surfaces reach or exceed 1 acre?

2.3.1.1(a)

This sentence might be clearer if it read "Identifies and estimates, for each pollutant for which the water is impaired, a load from each increased discharge."

2.3.2 New Dischargers

The purpose and effect of this subsection is unclear. I read this section as indicating that any discharging activity within the "urbanized area" that was not functioning as of 8/13/1979 is a "new discharger". This interpretation would suggest that any subject area in which growth has occurred since that date is a "new discharger", and therefore, in accordance with Part 2.3.2.1 below, current discharges from the subject area would not be eligible for permits under this program. Please clarify the intent and meaning of this subsection.

2.3.2.1 New Discharger to Impaired Waters without an Approved TMDL

I read this subsection as applying only to direct discharges, not to new discharges to the MS4. Is that correct?

2.4.2 Public Education and Outreach

The objective of this section is laudable and appropriate. Unfortunately, its implementation will add at least several thousand dollars per year to the municipal storm water budget and therefore exacerbate the budgetary problem outlined under my general comments above. This cost could be increased several fold, depending on the rigor of the program evaluation methods required. Few communities have the requisite expertise in-house to design, implement and evaluate such programs, and will therefore be compelled to rely on external expertise and assistance, again at a cost that is likely unbudgeted

2.4.4 Illicit Discharge Detection and Elimination (IDDE) Program

It is, on a comparative basis, relatively easy to determine if a discharge from an MS4 is contaminated. EPA should allow the utilization of inexpensive screening techniques such as the "optical brightness test" as well as visual and olfactory methods for detecting contaminated discharges. Experience has shown that locating and identifying the source

or sources of such contamination within a closed MS4 system can be difficult and costly, particularly with smaller-diameter conduits. EPA should identify the procedures and techniques that it considers to be reasonably and economically applicable to such situations.

2.4.4.4 – Non-stormwater Discharges

Is it intended that the required evaluation be undertaken with respect to categories of sources of conditionally exempt non-stormwater discharges, or with respect to individual sources?

2.4.4.5 – Sanitary Sewer Overflows

Is it correct to assume that the definition of SSOs set forth in 2.4.4.5 (a) is inclusive and that a leak of sanitary sewage from a defective conduit or manhole through soil to a water body or storm drain does not constitute a SSO?

2.4.4.7 - Outfall Inventory

This sub-Part will require an effort that is beyond the current and projected future capacity of Town staff and will therefore require contractual effort or, possibly, a sustained volunteer effort. Although an inventory does exist it is over 10 years old, has not been updated, and lacks much of the required detail. The sampling/analytical requirements would have to be contracted for.

2.4.7.1 d. iii Operation and Maintenance Program

Since limited data exists on the construction of catch basins within the town, the system mapping exercise will have to include determination of "sump depth" for all catch basins within the MS4 so that a "50% full depth" can be determined. The requirement for cleaning catch basins whose sumps are more than 50% full should post-date the completion of the system mapping program. Can a regularly-scheduled cleaning program be utilized in lieu of a measurement-based program?

Part 3.0 Outfall Monitoring Program

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3.1 Monitoring Frequency and Location

3.3 Wet Weather Analytical Monitoring

Random sampling during any stage of a wet weather event is unlikely to produce reliable or reproducible data, as the potential for contamination is highly variable with respect to both the stage of the event (e. g., first-flush) and its magnitude. It appears that EPA may be attempting to minimize the cost of the program (a desirable objective) but this would appear to come at a different cost-minimizing the value of the effort. Although first-flush samples are more likely to reveal contamination in smaller systems, larger systems with longer times of concentration may require a different monitoring regime. The monitoring requirement needs to be better thought out, in order to maximize value for each unit of expended effort.

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One option might be to require initial screening of wet weather discharges using a relatively simple and low-cost techniques such as sampling for optical brighteners, followed by multiple samples at identified problem outfalls during a subsequent wet-weather event.

END COMMENTS